

SEP 1 3 2000

510(k) Summary

SUBMITTER:

COBE Cardiovascular, Inc.

14401 W. 65th Way Arvada, CO 80004

CONTACT PERSON:

Lynne Leonard

Phone: (303) 467-6586 Fax: (303) 467-6429

DATE PREPARED:

August 18, 2000

DEVICE TRADE NAME:

COBE® SMAR_xT® VVR™ 4000 Filtered Venous Reservoir

COMMON/USUAL NAME:

Hardshell Venous Reservoir with Integral Cardiotomy Filter

CLASSIFICATION NAME:

Cardiopulmonary Bypass Blood Reservoir with Defoamer

and Cardiotomy Suction Line Blood Filter

PREDICATE DEVICE:

COBE® VVR™ 4000 Filtered Hardshell Venous Reservoir

DEVICE DESCRIPTION:

The COBE SMAR_xT VVR 4000 Filtered Venous Reservoir is a sealed hardshell venous reservoir with a defoamer and integral cardiotomy filter. It is a sterile device with non-pyrogenic fluid pathways, for single use only, and is not to be resterilized by the user.

INDICATIONS FOR USE

The COBE SMAR_xT VVR 4000 Filtered Venous Reservoir is intended to be used in adult surgical procedures requiring cardiopulmonary bypass for periods up to six hours.

STATEMENT OF TECHNICAL CHARACTERISTICS COMPARISON

The COBE SMAR_xT VVR 4000 Filtered Venous Reservoir described in this submission is substantially equivalent to the unmodified version, the COBE VVR 4000 Filtered Hardshell Venous Reservoir. The devices are identical in design, method of operation, and fundamental scientific technology. Both devices are intended to be used in adult surgical procedures requiring cardiopulmonary bypass for periods up to six hours. The devices differ in that the COBE SMAR_xT VVR 4000 Filtered Venous Reservoir contains a surface-modifying material that improves the blood compatibility of the device.

TESTING TO DETERMINE SUBSTANTIAL EQUIVALENCE

In-vitro tests were performed to demonstrate that the COBE SMAR_xT VVR 4000 Filtered Venous Reservoir described in this submission is substantially equivalent to the unmodified version, the COBE VVR 4000 Filtered Hardshell Venous Reservoir.



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Food and Drug Administration 9200 Corporate Boulevard Rockville MD 20850

COBE Cardiovascular, Inc. c/o Ms. Lynne Leonard Sr. Regulatory and Clinical Affairs Manager 14401 W. 65th Way Arvada, CO 80004-3599

Re: K002591

COBE® SMARxT® VVR™ 4000 Filtered Hardshell Venous Reservoir

Regulatory Class: III (three)

Product Code: DTP Dated: August 18, 2000 Received: August 21, 2000

Dear Ms. Leonard:

We have reviewed your Section 510(k) notification of intent to market the device referenced above and we have determined the device is substantially equivalent (for the indications for use stated in the enclosure) to legally marketed predicate devices marketed in interstate commerce prior to May 28, 1976, the enactment date of the Medical Device Amendments, or to devices that have been reclassified in accordance with the provisions of the Federal Food, Drug, and Cosmetic Act (Act). You may, therefore, market the device, subject to the general controls provisions of the Act. The general controls provisions of the Act include requirements for annual registration, listing of devices, good manufacturing practice, labeling, and prohibitions against misbranding and adulteration.

If your device is classified (see above) into either class II (Special Controls) or class III (Premarket Approval), it may be subject to such additional controls. Existing major regulations affecting your device can be found in the Code of Federal Regulations, Title 21, Parts 800 to 895. A substantially equivalent determination assumes compliance with the Current Good Manufacturing Practice requirements, as set forth in the Quality System Regulation (QS) for Medical Devices: General regulation (21 CFR Part 820) and that, through periodic QS inspections, the Food and Drug Administration (FDA) will verify such assumptions. Failure to comply with the GMP regulation may result in regulatory action. In addition, FDA may publish further announcements concerning your device in the Federal Register. Please note: this response to your premarket notification submission does not affect any obligation you might have under sections 531 through 542 of the Act for devices under the Electronic Product Radiation Control provisions, or other Federal laws or regulations.

This letter will allow you to begin marketing your device as described in your 510(k) premarket notification. The FDA finding of substantial equivalence of your device to a legally marketed predicate device results in a classification for your device and thus, permits your device to proceed to the market.

If you desire specific advice for your device on our labeling regulation (21 CFR Part 801 and additionally 809.10 for in vitro diagnostic devices), please contact the Office of Compliance at (301) 594-4648. Additionally, for questions on the promotion and advertising of your device, please contact the Office of Compliance at (301) 594-4639. Also, please note the regulation entitled, "Misbranding by reference to premarket notification" (21CFR 807.97). Other general information on your responsibilities under the Act may be obtained from the Division of Small Manufacturers Assistance at its toll-free number (800) 638-2041 or (301) 443-6597 or at its Internet address "http://www.fda.gov/cdrh/dsma/dsmamain.html".

Sincerely yours,

James E. Dillard III

Director

Division of Cardiovascular and Respiratory Devices Office of Device Evaluation Center for Devices and Radiological Health

Enclosure

Indications For Use

510(k) Number	(If known):	1002591	 	
Device Name:	COBE® SMAR,	T [®] VVR™ 4000 Filte	red Hardshell Venous	s Reservoir
Indications For U	The COBE® SMA	.R _x T [®] VVR™ 4000 Fi	Itered Hardshell Vend	ous Reservoir is intended to be used in
a.	dult surgical prod	cedures requiring card	iopulmonary bypass i	for periods up to six hours.
PLEASE	DO NOT WRIT	E BELOW THIS LIN	E - CONTINUE ON A	ANOTHER PAGE IF NEEDED)
Concurrence of CDRH, Office of Device Evaluation (ODE)				
		and Neurologica	iovascular, Respirato	ory,
Prescription Us (Per 21 CFR 80			OR	Over-The-Counter Use